

GUIDELINES FOR GREEN INFRASTRUCTURE COMPONENTS

The Safe Drinking Water State Revolving Fund (SDWSRF) contains specific provisions concerning the funding of green infrastructure. Collectively, green infrastructure includes energy efficiency, water efficiency, green design, and environmentally innovative projects. Using guidance from the U.S. Environmental Protection Agency (USEPA), the following information is provided to aid water systems in identifying the project components that may be classified as green infrastructure for the purpose of the SDWSRF funding. All SDWSRF applications must provide descriptions, costs, and benefits for green infrastructure components in Section D of the Applicant Engineering Report (Enclosure 3c).

Energy Efficiency:

- I. Definition: Energy efficiency includes components that reduce the energy consumption of eligible drinking water infrastructure projects. Information on energy efficiency can be found at the following websites.
 1. EPA's clean energy website: <http://www.epa.gov/cleanenergy/>
 2. CA Energy Commission's energy efficiency programs website: <http://www.energy.ca.gov/efficiency/>
- II. Examples of energy efficiency components include, but are not limited to:
 1. Energy efficient retrofits and upgrades to pumps and treatment processes;
 2. Producing clean power for treatment systems on site (wind, solar, hydroelectric, geothermal, biogas powered combined heat and power);
 3. Replacement or rehabilitation of distribution lines if the component is part of a project that is in a fundable category.

Water Efficiency:

- I. Definition: Water efficiency is the use of improved technology and practices to deliver equal or better services with less water. Information on water efficiency can be found at the following websites:
 1. EPA's WaterSense program website: <http://www.epa.gov/watersense>
 2. CA Department of Water Resources' water efficiency website: <http://www.owue.water.ca.gov/>
- II. Examples of water efficiency components include, but are not limited to:
 1. Installation of water meters or automated meter reading systems;
 2. Replacement or rehabilitation of distribution lines;
 3. Purchase of water efficient fixtures, fittings, equipment, or appliances only if they are components of a larger capital improvement project in a fundable category.

Green Design:

- I. Definition: Green design includes a wide array of passive practices that manage wet weather to maintain and restore natural hydrology by infiltrating, evapotranspiring and capturing and using stormwater. Within the context of the ARRA funding process, green infrastructure consists of site-specific practices, such as green roofs and porous pavement at drinking water utility facilities. In addition to managing rainfall, these green design components can simultaneously provide other benefits such as reducing energy demands.
- II. Examples of projects include, but are not limited to:
 1. Implementation of wet weather management systems for utility buildings which include: the incremental cost of porous pavement, bioretention, trees, green roofs, and other practices that mimic natural hydrology and reduce effective imperviousness.

Environmentally Innovative Projects:

- I. Definition: Within the context of the SDWSRF funding process, “environmentally innovative projects” would include those that are: (1) consistent with the underlying project eligibilities of the SDWSRF program; and (2) consistent with the timelines and objectives of the SDWSRF program; and (3) that demonstrate new and/or innovative approaches to delivering service and/or managing water resources in a more sustainable way, including projects that achieve public health protection and environmental protection objectives at the least life-cycle costs,
- II. Examples of environmentally innovative components include, but are not limited to:
 1. Components that enable the utility to adapt to the impacts of global climate change;
 2. Components that are consistent with a “Total Water Management” planning framework; or other planning framework within which project life cycle costs (including infrastructure, energy consumption and other operational costs) are minimized.